

DOCKET NO.: JANS-0026 (JAB-1499 US)

PATENT

Application No.: 10/019,380

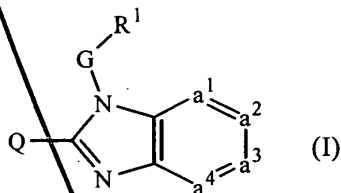
Office Action Dated: April 18, 2003

This listing of claims will replace all prior versions, and listings, of claims in the application.

Listing of Claims:

1. (currently amended)

A compound of formula

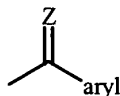


a prodrug, N-oxide, addition salt, quaternary amine, metal complex or stereochemically isomeric form thereof wherein

$-a^1=a^2-a^3=a^4-$  represents a bivalent radical of formula

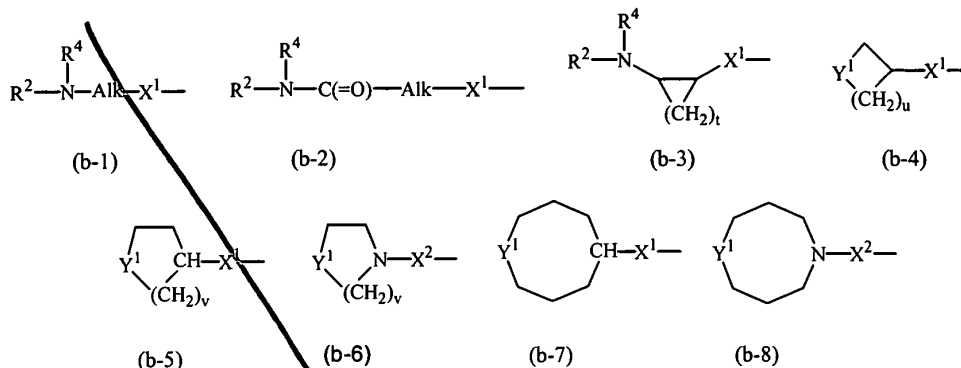
- CH=CH-CH=CH- (a-1);
- N=CH-CH=CH- (a-2);
- CH=N-CH=CH- (a-3);
- CH=CH-N=CH- (a-4); or
- CH=CH-CH=N- (a-5);

wherein each hydrogen atom in the radicals (a-1), (a-2), (a-3), (a-4) and (a-5) may optionally be replaced by halo, C<sub>1-6</sub>alkyl, nitro, amino, hydroxy, C<sub>1-6</sub>alkyloxy, polyhaloC<sub>1-6</sub>alkyl, carboxyl, aminoC<sub>1-6</sub>alkyl, mono- or di(C<sub>1-4</sub>alkyl)aminoC<sub>1-6</sub>alkyl, C<sub>1-6</sub>alkyloxycarbonyl, hydroxyC<sub>1-6</sub>alkyl, or a radical of formula



wherein =Z is =O, =CH-C(=O)-NR<sup>5a</sup>R<sup>5b</sup>, =CH<sub>2</sub>, =CH-C<sub>1-6</sub>alkyl, =N-OH or =N-O-C<sub>1-6</sub>alkyl;

Q is a radical of formula



wherein Alk is C<sub>1-6</sub>alkanediyl;

Y<sup>1</sup> is a bivalent radical of formula -NR<sup>2</sup>- or -CH(NR<sup>2</sup>R<sup>4</sup>)-;

X<sup>1</sup> is NR<sup>4</sup>, S, S(=O), S(=O)<sub>2</sub>, O, CH<sub>2</sub>, C(=O), C(=CH<sub>2</sub>), CH(OH), CH(CH<sub>3</sub>), CH(OCH<sub>3</sub>), CH(SCH<sub>3</sub>), CH(NR<sup>5a</sup>R<sup>5b</sup>), CH<sub>2</sub>-NR<sup>4</sup> or NR<sup>4</sup>-CH<sub>2</sub>;

X<sup>2</sup> is a direct bond, CH<sub>2</sub>, C(=O), NR<sup>4</sup>, C<sub>1-4</sub>alkyl-NR<sup>4</sup>, NR<sup>4</sup>-C<sub>1-4</sub>alkyl;

t is 2, 3, 4 or 5;

u is 1, 2, 3, 4 or 5;

v is 2 or 3; and

whereby each hydrogen atom in Alk and the carbocycles and the heterocycles defined in radicals (b-3), (b-4), (b-5), (b-6), (b-7) and (b-8) may optionally be replaced by R<sup>3</sup>; with the proviso that when R<sup>3</sup> is hydroxy or C<sub>1-6</sub>alkyloxy, then R<sup>3</sup> can not replace a hydrogen atom in the α position relative to a nitrogen atom;

G is C<sub>1-10</sub>alkanediyl substituted with one or more hydroxy, C<sub>1-6</sub>alkyloxy, arylC<sub>1-6</sub>alkyloxy, C<sub>1-6</sub>alkylthio, arylC<sub>1-6</sub>alkylthio, HO(-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>-, C<sub>1-6</sub>alkyloxy (-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>- or arylC<sub>1-6</sub>alkyloxy(-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>-;

R<sup>1</sup> is a monocyclic heterocycle or aryl; said heterocycle being selected from piperidinyl, piperazinyl, pyridyl, pyrazinyl, pyridazinyl, pyrimidinyl, furanyl, tetrahydrofuranyl, thienyl, pyrrolyl, thiazolyl, oxazolyl, imidazolyl, isothiazolyl, pyrazolyl, isoxazolyl, oxadiazolyl; and each heterocycle may optionally be substituted with 1 or where possible more, such as 2, 3 or 4, substituents selected from halo, hydroxy, amino, cyano, carboxy, C<sub>1-6</sub>alkyl, C<sub>1-6</sub>alkyloxy, C<sub>1-6</sub>alkylthio,

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C<sub>1-6</sub>alkyloxyC<sub>1-6</sub>alkyl, aryl, arylC<sub>1-6</sub>alkyl, arylC<sub>1-6</sub>alkyloxy, hydroxyC<sub>1-6</sub>alkyl, mono- or di(C<sub>1-6</sub>alkyl)amino, mono- or di(C<sub>1-6</sub>alkyl)aminoC<sub>1-6</sub>alkyl, polyhaloC<sub>1-6</sub>alkyl, C<sub>1-6</sub>alkylcarbonylamino, C<sub>1-6</sub>alkyl-SO<sub>2</sub>-NR<sup>5c</sup>-, aryl-SO<sub>2</sub>-NR<sup>5c</sup>-, C<sub>1-6</sub>alkyloxycarbonyl, -C(=O)-NR<sup>5c</sup>R<sup>5d</sup>-, HO(-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>-, halo(-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>-, C<sub>1-6</sub>alkyloxy(-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>-, arylC<sub>1-6</sub>alkyloxy(-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>- and mono- or di(C<sub>1-6</sub>alkyl)amino (-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>;

each n independently is 1, 2, 3 or 4;

R<sup>2</sup> is hydrogen, formyl, C<sub>1-6</sub>alkylcarbonyl, Hetcarbonyl, pyrrolidinyl, piperidinyl, homopiperidinyl, C<sub>3-7</sub>cycloalkyl substituted with N(R<sup>6</sup>)<sub>2</sub>, or C<sub>1-10</sub>alkyl substituted with N(R<sup>6</sup>)<sub>2</sub> and optionally with a second, third or fourth substituent selected from amino, hydroxy, C<sub>3-7</sub>cycloalkyl, C<sub>2-5</sub>alkanediyl, piperidinyl, mono- or di(C<sub>1-6</sub>alkyl)amino, C<sub>1-6</sub>alkyloxycarbonylamino, aryl and aryloxy;

R<sup>3</sup> is hydrogen, hydroxy, C<sub>1-6</sub>alkyl, C<sub>1-6</sub>alkyloxy, arylC<sub>1-6</sub>alkyl or arylC<sub>1-6</sub>alkyloxy;

R<sup>4</sup> is hydrogen, C<sub>1-6</sub>alkyl or arylC<sub>1-6</sub>alkyl;

R<sup>5a</sup>, R<sup>5b</sup>, R<sup>5c</sup> and R<sup>5d</sup> each independently are hydrogen or C<sub>1-6</sub>alkyl; or

R<sup>5a</sup> and R<sup>5b</sup>, or R<sup>5c</sup> and R<sup>5d</sup> taken together form a bivalent radical of formula -(CH<sub>2</sub>)<sub>s</sub>- wherein s is 4 or 5;

R<sup>6</sup> is hydrogen, C<sub>1-4</sub>alkyl, formyl, hydroxyC<sub>1-6</sub>alkyl, C<sub>1-6</sub>alkylcarbonyl or C<sub>1-6</sub>alkyloxycarbonyl;

aryl is phenyl or phenyl substituted with 1 or more, ~~such as 2, 3 or 4~~, substituents selected from halo, hydroxy, C<sub>1-6</sub>alkyl, hydroxyC<sub>1-6</sub>alkyl, polyhaloC<sub>1-6</sub>alkyl, and C<sub>1-6</sub>alkyloxy; and

Het is pyridyl, pyrimidinyl, pyrazinyl, or pyridazinyl.

2. (previously amended) A compound according to claim 1, wherein -a<sup>1</sup>=a<sup>2</sup>-a<sup>3</sup>=a<sup>4</sup>- is a radical of formula (a-1) or (a-2).

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3. *(previously amended)* A compound according to claim 1, wherein R<sup>1</sup> is phenyl optionally substituted with halo, C<sub>1-6</sub>alkyl or C<sub>1-4</sub>alkyloxy; or pyridyl optionally substituted with 1 or more substituents selected from arylC<sub>1-6</sub>alkyloxy, C<sub>1-6</sub>alkyloxyC<sub>1-6</sub>alkyl, aryl, mono- or di(C<sub>1-6</sub>alkyl)amino, C(=O)-NR<sup>5c</sup>R<sup>5d</sup>, halo or C<sub>1-6</sub>alkyl.
4. *(previously amended)* A compound according to claim 1, wherein G is C<sub>1-4</sub>alkanediyl substituted with hydroxy, C<sub>1-6</sub>alkyloxy, HO(-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>-, C<sub>1-6</sub>alkyloxy(-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>- or arylC<sub>1-6</sub>alkyloxy(-CH<sub>2</sub>-CH<sub>2</sub>-O)<sub>n</sub>-.
5. *(previously amended)* A compound according to claim 1, wherein Q is a radical of formula (b-5) wherein v is 2 and Y<sup>1</sup> is -NR<sup>2</sup>-.
6. *(previously amended)* A compound according to claim 1, wherein X<sup>1</sup> is NH or CH<sub>2</sub>.
7. *(previously amended)* A compound according to claim 1, wherein R<sup>2</sup> is hydrogen or C<sub>1-10</sub>alkyl substituted with NHR<sup>6</sup> wherein R<sup>6</sup> is hydrogen or C<sub>1-6</sub>alkyloxycarbonyl.
8. *(original)* A compound according to claim 1, wherein the compound is [(A),(S)]-N-[1-(2-amino-3-methylbutyl)-4-piperidiny]-1-[(6-bromo-2-pyridiny)ethoxymethyl]-1H-benzimidazol-2-amine; [(A),(S)]-N-[1-(2-aminopropyl)-4-piperidiny]-1-[ethoxy(6-methyl-2-pyridiny)methyl]-1H-benzimidazol-2-amine (compound 75); (±)-N-[1-(2-amino-3-methylbutyl)-4-piperidiny]-1-[(2-methoxyethoxy)(6-methyl-2-pyridiny)methyl]-1H-benzimidazol-2-amine; N-[1-(2-amino-3-methylbutyl)-4-piperidiny]-6-chloro-1-[(2-methoxyethoxy)(6-methyl-2-pyridiny)methyl]-4-methyl-1H-benzimidazol-2-amine trihydrochloride trihydrate; [(A),(R)]-N-[1-(2-amino-3-methylbutyl)-4-piperidiny]-1-[ethoxy(6-methyl-2-pyridiny)methyl]-1H-benzimidazol-2-amine monohydrate; (±)-N-[1-(2-

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aminopropyl)-4-piperidinyl]-1-[ethoxy(6-methyl-2-pyridinyl)methyl]-1H-benzimidazol-2-amine; [(A)(S)]-N-[1-(2-amino-3-methylbutyl)-4-piperidinyl]-1-[ethoxy(6-methyl-2-pyridinyl)methyl]-1H-benzimidazol-2-amine monohydrate; (±)-N-[1-(2-amino-3-methylbutyl)-4-piperidinyl]-1-[ethoxy(6-methyl-2-pyridinyl)methyl]-1H-benzimidazol-2-amine; [(A),(R)]-N-[1-(2-aminopropyl)-4-piperidinyl]-1-[ethoxy(6-methyl-2-pyridinyl)methyl]-1H-benzimidazol-2-amine monohydrate; (±)-N-[1-(2-aminoethyl)-4-piperidinyl]-1-[(6-bromo-2-pyridinyl)ethoxymethyl]-2-benzimidazol-2-amine; (±)-N-[1-(2-aminoethyl)-4-piperidinyl]-1-[(2-ethoxyethoxy)(6-methyl-2-pyridinyl)methyl]-1H-benzimidazol-2-amine; [(B),(S)] N-[1-(2-aminopropyl)-4-piperidinyl]-1-[ethoxy(6-methyl-2-pyridinyl)methyl]-1H-benzimidazol-2-amine monohydrate; (±)-N-[1-(2-amino-3-methylbutyl)-4-piperidinyl]-3-[(2-methoxyethoxy)(6-methyl-2-pyridinyl)methyl]-7-methyl-3H-imidazo[4,5-b]pyridin-2-amine; (±)-N-[1-(2-amino-3-methylbutyl)-4-piperidinyl]-1-[(2-ethoxyethoxy)(6-phenyl-2-pyridinyl)methyl]-1H-benzimidazol-2-amine; (±)-N-[1-(2-aminoethyl)-4-piperidinyl]-1-[(2-methoxyethoxy)(6-methyl-2-pyridinyl)methyl]-1H-benzimidazol-2-amine; (±)-N-[1-(2-amino-3-methylbutyl)-4-piperidinyl]-1-[(6-bromo-2-pyridinyl)ethoxymethyl]-4-methyl-1H-benzimidazol-2-amine monohydrate; [(A),(R)]-N-[1-(2-amino-3-methylbutyl)-4-piperidinyl]-1-[(6-bromo-2-pyridinyl)ethoxymethyl]-1H-benzimidazol-2-amine; (±)-N-[1-(2-amino-3-methylbutyl)-4-piperidinyl]-1-[(6-bromo-2-pyridinyl)ethoxymethyl]-1H-benzimidazol-2-amine; a prodrug, N-oxide, addition salt, quaternary amine, metal complex or stereochemically isomeric form thereof.

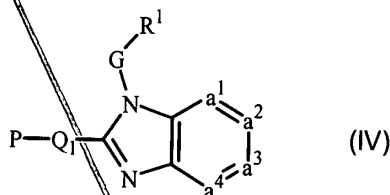
9. (currently amended) A method of ~~using as a medicine treating a viral infection,~~  
comprising the step of administering a therapeutically effective amount of a  
compound as claimed in any one of claims 1 to 8.

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10. *(previously amended)* A pharmaceutical composition, comprising a pharmaceutically acceptable carrier, and as active ingredient a therapeutically effective amount of a compound as claimed in any one of claims 1 to 8.

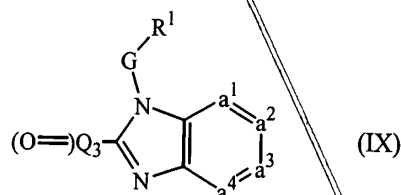
11. *(previously amended)* A process of preparing a composition as claimed in claim 10, comprising the step of intimately mixing said carrier with said compound.

12. *(original)* An intermediate of formula



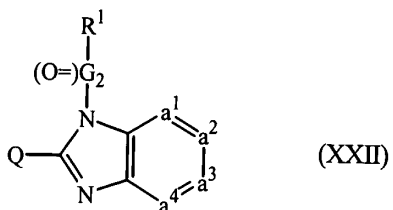
with  $R^1$ , G and  $-a^1=a^2-a^3=a^4-$  defined as in claim 1, P being a protective group, and  $Q_1$  being defined as Q according to claim 1 provided that it is devoided of the  $R^2$  or  $R^6$  substituent.

13. *(original)* An intermediate of formula



with  $R^1$ , G and  $-a^1=a^2-a^3=a^4-$  defined as in claim 1, and  $(O=)Q_3$  being a carbonyl derivative of Q, said Q being defined according to claim 1, provided that it is devoided of the  $-NR^2R^4$  or  $-NR^2-$  substituent.

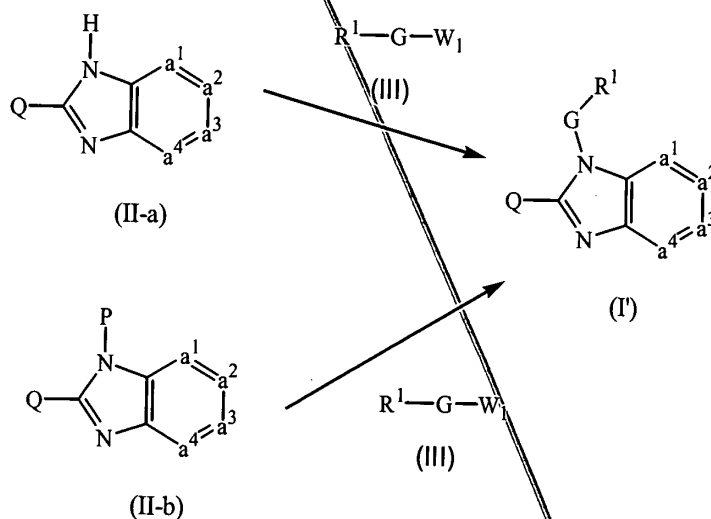
14. *(original)* An intermediate of formula



with  $R^1$ , Q and  $-a^1=a^2-a^3=a^4-$  defined as in claim 1, and  $(O=)G_2$  being a carbonyl derivative of G, said G being defined according to claim 1.

15. (currently amended) A process of preparing a compound as claimed in claim 1, comprising at least one step selected from the group consisting of:

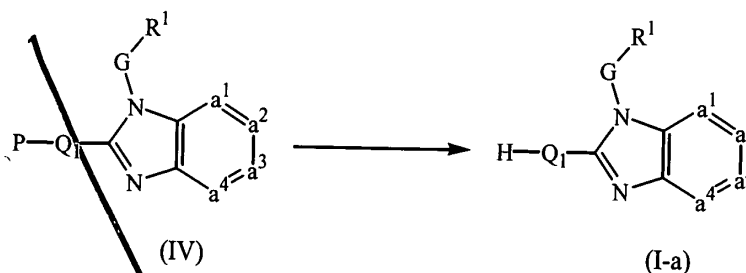
- a) reacting an intermediate of formula (II-a) or (II-b) with an intermediate of formula (III)



with  $R^1$ , G, Q and  $-a^1=a^2-a^3=a^4-$  defined as in claim 1, and  $W_1$  being a suitable leaving group, in the presence of a suitable base and in a suitable reaction-inert solvent;

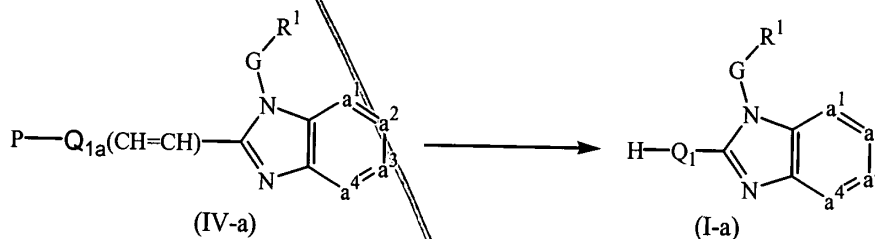
- b) deprotecting an intermediate of formula (IV)

C1  
D1  
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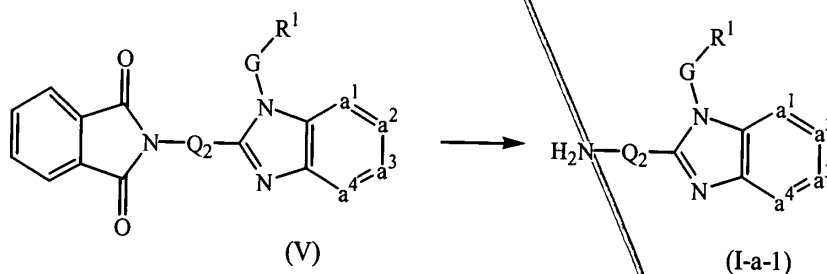
with  $R^1$ , G, and  $-a^1=a^2-a^3=a^4$  defined as in claim 1, H-Q<sub>1</sub> being defined as Q according to claim 1 provided that R<sup>2</sup> or at least one R<sup>6</sup> substituent is hydrogen, and P being a protective group;

- c) deprotecting and reducing an intermediate of formula (IV-a)



with  $R^1$ , G, and  $-a^1=a^2-a^3=a^4$  defined as in claim 1, H-Q<sub>1</sub> being defined as Q according to claim 1 provided that R<sup>2</sup> or at least one R<sup>6</sup> substituent is hydrogen, Q<sub>1a</sub>(CH=CH) being defined as Q<sub>1</sub> provided that Q<sub>1</sub> comprises an unsaturated bond, and P being a protective group;

- d) deprotecting an intermediate of formula (V)

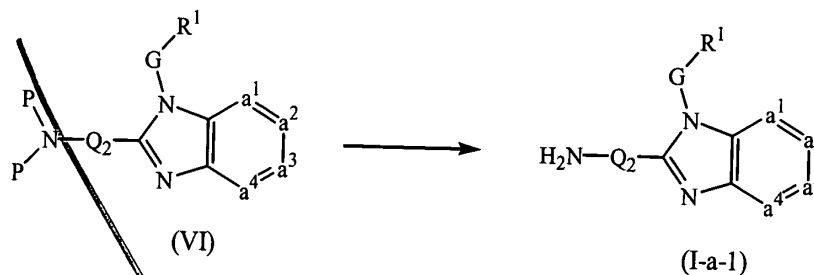


with  $R^1$ , G, and  $-a^1=a^2-a^3=a^4$  defined as in claim 1, and H<sub>2</sub>N-Q<sub>2</sub> being defined as Q according to claim 1 provided that both R<sup>6</sup> substituents are hydrogen or R<sup>2</sup> and R<sup>4</sup> are both hydrogen;

- e) deprotecting an intermediate of formula (VI)

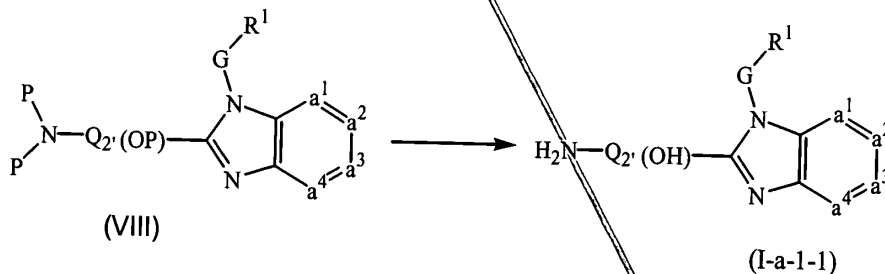
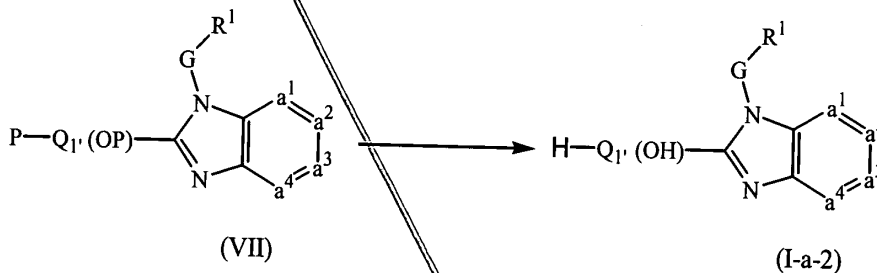


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with  $R^1$ , G, and  $-a^1=a^2-a^3=a^4$  defined as in claim 1, and  $H_2N-Q_2$  being defined as Q according to claim 1 provided that both  $R^6$  substituents are hydrogen or  $R^2$  and  $R^4$  are both hydrogen, and P being a protective group;

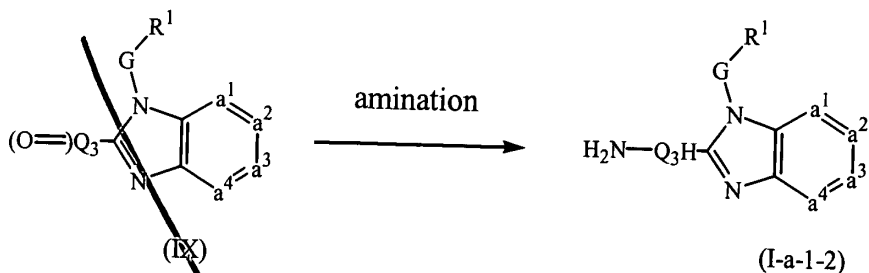
f) deprotecting an intermediate of formula (VII) or (VIII)



with  $R^1$ , G, and  $-a^1=a^2-a^3=a^4$  defined as in claim 1,  $H-Q_1'(OH)$  being defined as Q according to claim 1 provided that  $R^2$  or at least one  $R^6$  substituent is hydrogen and provided that Q comprises a hydroxy moiety,  $H_2N-Q_2'(OH)$  being defined as Q according to claim 1 provided that both  $R^6$  substituents are hydrogen or  $R^2$  and  $R^4$  are both hydrogen and provided that Q comprises a hydroxy moiety, and P being a protective group;

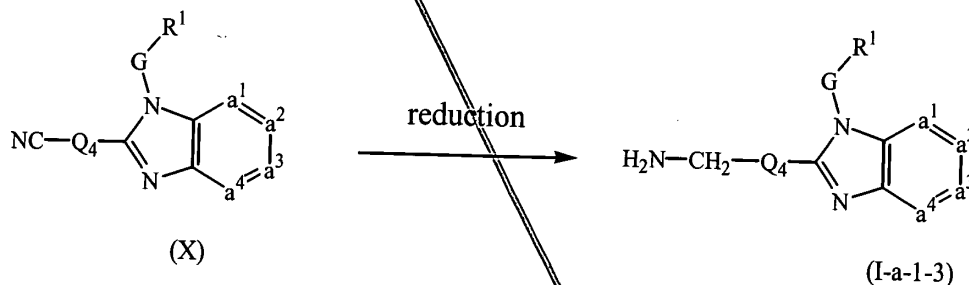
g) amination of an intermediate of formula (IX)

C1  
Q1  
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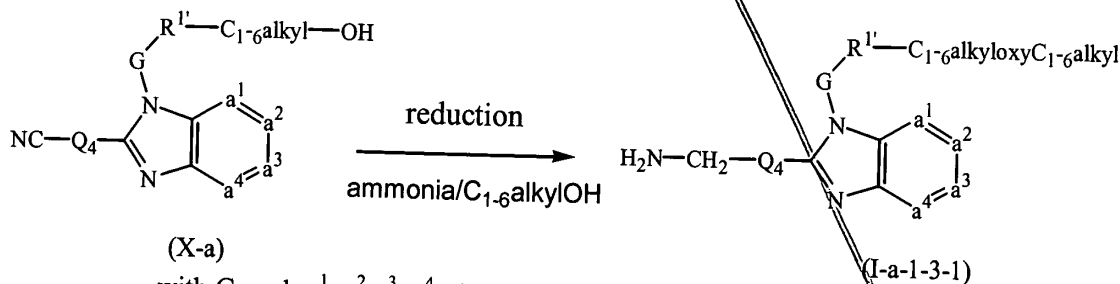
with  $R^1$ , G, and  $-a^1=a^2-a^3=a^4-$  defined as in claim 1, and  $H_2N-Q_3H$  being defined as Q according to claim 1 provided that both  $R^6$  substituents are hydrogen or  $R^2$  and  $R^4$  are both hydrogen, and the carbon adjacent to the nitrogen carrying the  $R^6$ , or  $R^2$  and  $R^4$  substituents contains at least one hydrogen, in the presence of a **suitable** an amination reagent;

h) reducing an intermediate of formula (X)



with  $R^1$ , G, and  $-a^1=a^2-a^3=a^4-$  defined as in claim 1, and  $H_2N-CH_2-Q_4$  being defined as Q according to claim 1 provided that Q comprises a  $-CH_2-NH_2$  moiety, in the presence of a **suitable** reducing agent;

i) reducing an intermediate of formula (X-a)

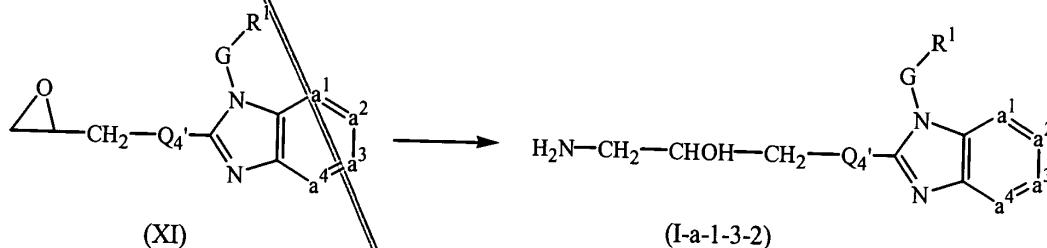


with G, and  $-a^1=a^2-a^3=a^4-$  defined as in claim 1,  $H_2N-CH_2-Q_4$  being defined as Q according to claim 1 provided that Q comprises a  $-CH_2-NH_2$  moiety, and  $R^{1'}$

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 P1  
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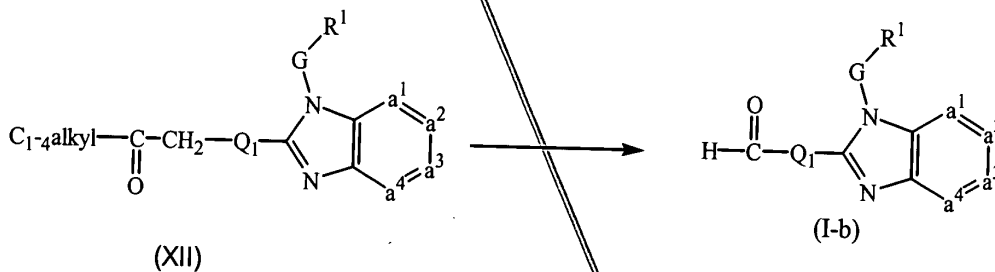
being defined as  $R^1$  according to claim 1 provided that it comprises at least one substituent, in the presence of a **suitable** reducing agent and **suitable** solvent;

j) amination of an intermediate of formula (XI)



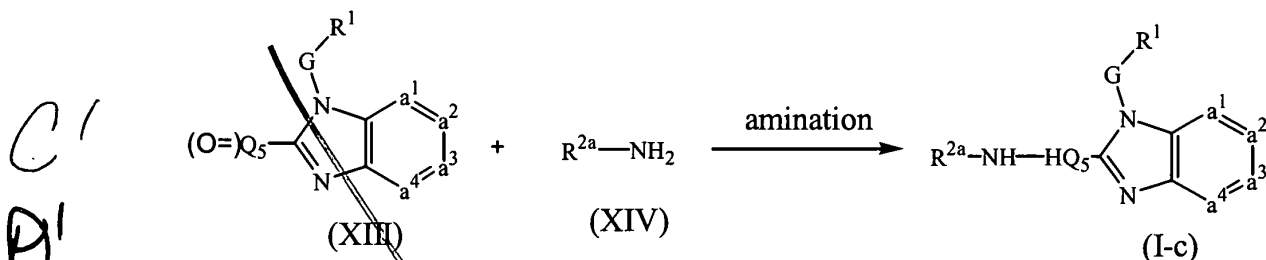
with  $R^1$ , G, and  $-a^1=a^2-a^3=a^4-$  defined as in claim 1, and  $H_2N-CH_2-CHOH-CH_2-Q_4'$  being defined as Q according to claim 1 provided that Q comprises a  $CH_2-CHOH-CH_2-NH_2$  moiety, in the presence of a **suitable** an amination reagent;

k) reacting an intermediate of formula (XII) with formic acid, formamide and ammonia



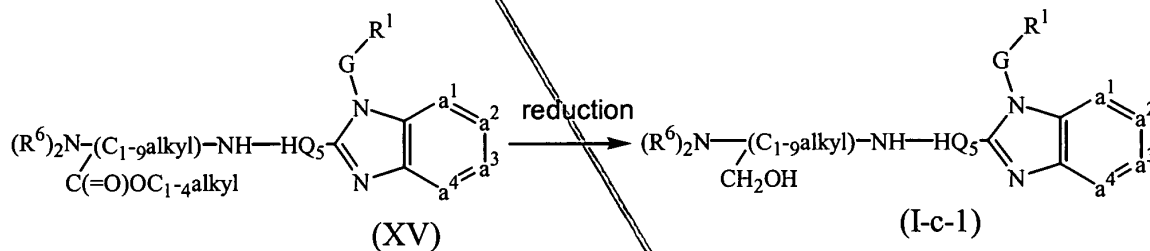
with  $R^1$ , G, and  $-a^1=a^2-a^3=a^4-$  defined as in claim 1, and  $H-C(=O)-Q_1$  being defined as Q according to claim 1 provided that  $R^2$  or at least one  $R^6$  substituent is formyl;

l) amination of an intermediate of formula (XIII) by reaction with an intermediate of formula (XIV)



with R<sup>1</sup>, G, and -a<sup>1</sup>=a<sup>2</sup>-a<sup>3</sup>=a<sup>4</sup>- defined as in claim 1, and R<sup>2a</sup>-NH-HQ<sub>5</sub> being defined as Q according to claim 1 provided that R<sup>2</sup> is other than hydrogen and is represented by R<sup>2a</sup>, R<sup>4</sup> is hydrogen, and the carbon atom adjacent to the nitrogen atom carrying the R<sup>2</sup> and R<sup>4</sup> substituents, carries also at least one hydrogen atom, in the presence of a **suitable** reducing agent;

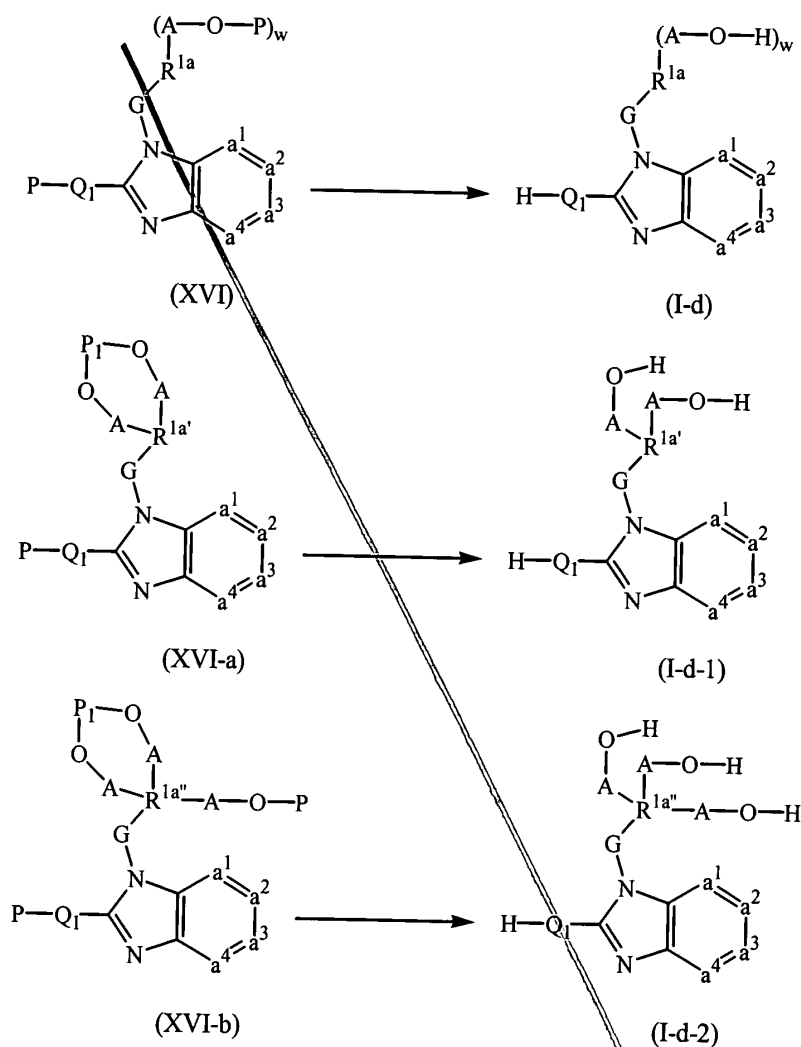
m) reducing an intermediate of formula (XV)



with R<sup>1</sup>, G, and -a<sup>1</sup>=a<sup>2</sup>-a<sup>3</sup>=a<sup>4</sup>- defined as in claim 1, and (R<sup>6</sup>)<sub>2</sub>N-[(C<sub>1-9</sub>alkyl)CH<sub>2</sub>OH]-NH-HQ<sub>5</sub> being defined as Q according to claim 1 provided that R<sup>2</sup> is other than hydrogen and is represented by C<sub>1-10</sub>alkyl substituted with N(R<sub>6</sub>)<sub>2</sub> and with hydroxy, and the carbon atom carrying the hydroxy, carries also two hydrogen atoms, and provided that R<sup>4</sup> is hydrogen, and the carbon atom adjacent to the nitrogen atom carrying the R<sup>2</sup> and R<sup>4</sup> substituents, carries also at least one hydrogen atom, with a **suitable** reducing agent;

n) deprotecting an intermediate of formula (XVI), (XVI-a) or (XVI-b)

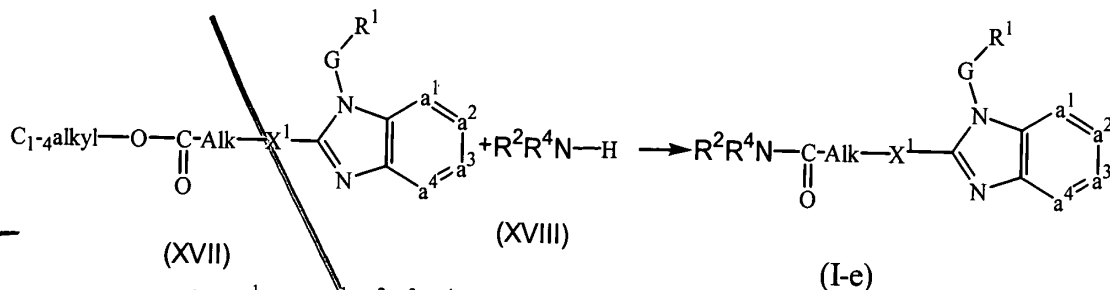
C1  
D1  
cont



with  $G$ , and  $-a^1=a^2-a^3=a^4$  defined as in claim 1, and  $H-Q_1$  being defined as  $Q$  according to claim 1 provided that  $R^2$  or at least one  $R^6$  substituent is hydrogen, and  $R^{1a}-(A-O-H)_w$ ,  $R^{1a'}-(A-O-H)_2$  and  $R^{1a''}-(A-O-H)_3$  being defined as  $R^1$  according to claim 1 provided that  $R^1$  is substituted with hydroxy, hydroxy $C_{1-6}$ alkyl, or  $HO(-CH_2-CH_2-O)_n-$ , with  $w$  being an integer from 1 to 4 and  $P$  or  $P_1$  being a suitable protecting group, with a suitable acid;

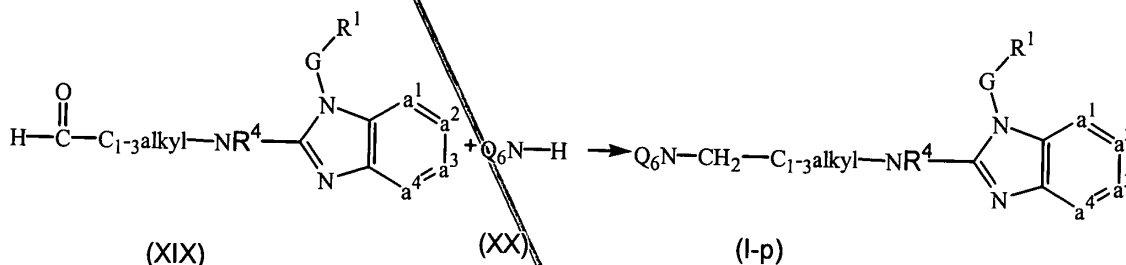
- o) amination of an intermediate of formula (XVII)

C'  
D'  
cont



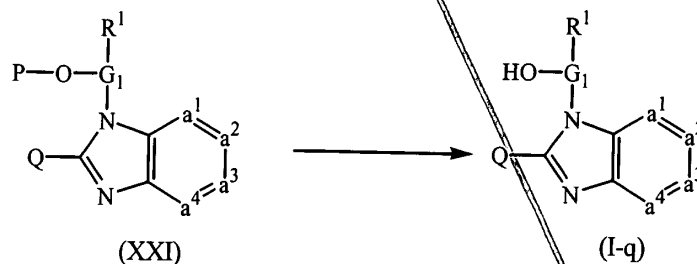
with  $\text{R}^1$ , G,  $-\text{a}^1=\text{a}^2-\text{a}^3=\text{a}^4-$ , Alk,  $\text{X}^1$ ,  $\text{R}^2$  and  $\text{R}^4$  defined as in claim 1, in the presence of a suitable amination agent;

p) amination of an intermediate of formula (XIX)



with  $\text{R}^1$ , G, and  $-\text{a}^1=\text{a}^2-\text{a}^3=\text{a}^4-$  defined as in claim 1, and  $\text{Q}_6\text{N}-\text{CH}_2-\text{C}_{1-3}\text{alkyl}-\text{NR}^4$  being defined as Q according to claim 1 provided that in the definition of Q,  $\text{X}^2$  is  $\text{C}_{2-4}\text{alkyl}-\text{NR}^4$ , in the presence of a suitable an amination agent;

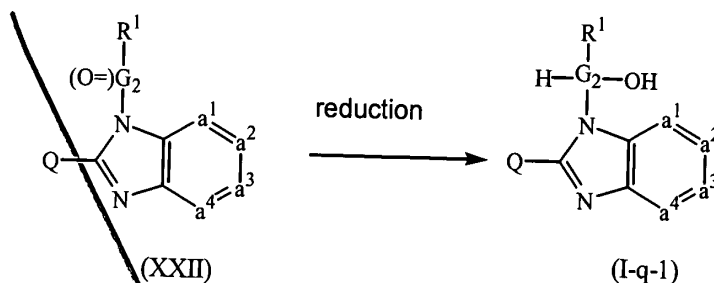
q) deprotecting an intermediate of formula (XXI)



with  $\text{R}^1$ , Q, and  $-\text{a}^1=\text{a}^2-\text{a}^3=\text{a}^4-$  defined as in claim 1, and  $\text{HO}-\text{G}_1$  being defined as G according to claim 1 provided that G is substituted with hydroxy or  $\text{HO}-(\text{CH}_2\text{CH}_2\text{O})_n$ ; and

r) reducing an intermediate of formula (XXII)

C1  
D1  
cont



with  $R^1$ , Q, and  $-a^1=a^2-a^3=a^4$  defined as in claim 1, and  $H-G_2-OH$  being defined as G according to claim 1 provided that G is substituted with hydroxy and the carbon atom carrying the hydroxy substituent carries also at least one hydrogen, in the presence of a **suitable** reducing agent.

16. (previously amended) A product, comprising:

- (a) a first compound as claimed in claim 1; and
- (b) a second antiviral compound,

wherein said first compound and said second compound are simultaneously, separately or sequentially used in the treatment or the prevention of viral infections.

17. (previously amended) A pharmaceutical composition, comprising:

- (a) a pharmaceutically acceptable carrier; and
- (b) as active ingredients:
  - i. a first compound as claimed in claim 1; and
  - ii. a second antiviral compound.

18. (previously added) The process of claim 15, further comprising the step of converting compound of formula (I'), stereochemically isomeric forms, metal complexes, quaternary amines or *N*-oxide forms thereof, into a therapeutically active non-toxic acid addition salt by treatment with an acid.

C1  
D1  
cont

19. *(previously added)* The process of claim 15, further comprising the step of converting compound of formula (I'), stereochemically isomeric forms, metal complexes, quaternary amines or *N*-oxide forms thereof, into a therapeutically active non-toxic base addition salt by treatment with alkali.
20. *(previously added)* The process of claim 15, further comprising the step of converting the acid addition salt form of compound of formula (I'), stereochemically isomeric forms, metal complexes, quaternary amines or *N*-oxide forms thereof, into the free base by treatment with alkali.
21. *(previously added)* The process of claim 15, further comprising the step of converting the base addition salt form of compound of formula (I'), stereochemically isomeric forms, metal complexes, quaternary amines or *N*-oxide forms thereof, into the free acid by treatment with acid.
22. *(new)* The process of claim 15, further comprising the step of converting said compound of formula (I'), stereochemically isomeric form, metal complex, quaternary amine or *N*-oxide form thereof, into a different form of compound of formula (I'), stereochemically isomeric form, metal complex, quaternary amine or *N*-oxide form thereof.